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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/922,746	08/07/2001	Shigeru Ohuchida	R2184.0113/P113	9588

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EXAMINER

ORTIZ CRIADO, JORGE L

ART UNIT	PAPER NUMBER
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2655

DATE MAILED: 05/13/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/922,746

Applicant(s)

OHUCHIDA, SHIGERU

Examiner

Jorge L Ortiz-Criado

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 01 March 2001.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-9 is/are pending in the application.
- 4a) Of the above claim(s) 10-12 and 15-22 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1,2,4-9,13 and 14 is/are rejected.
- 7) ☐ Claim(s) 3 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 07 August 2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 1,6,7.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Election/Restrictions

1. Applicant's election without traverse of species II, Figs. 2A, 5A and 5B, claims 1-3,5-9 and 13-14 in Paper No. 9 is acknowledged.
2. During a telephone conversation with Mark J. Thronson on 4/26/2004 a provisional election was made without traverse to prosecute the invention of species II, Figs. 2A, 5A and 5B, claim 4. Affirmation of this election must be made by applicant in replying to this Office action.
3. Claims 10-12 and 15-22 are withdrawn from further consideration pursuant to 37 CFR 1.142(b) as being drawn to a nonelected species, there being no allowable generic or linking claim. Election was made **without** traverse in Paper No. 9.

Claim Rejections - 35 USC § 102

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

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5. Claims 1-2, 4-7 and 13-14 are rejected under 35 U.S.C. 102(b) as being anticipated by Kamiyama JP Publication No. 2000-076689.

Regarding claim 1 and 14, Kamiyama discloses an optical disk drive including an optical pickup apparatus for accessing an optical recording medium (See Abstract), comprising:

a light source unit emitting one of a plurality of laser beams having different wavelengths, the light source unit including a first laser diode emitting a laser beam having a first wavelength and a second laser diode emitting a laser beam having a second wavelength (See Fig. 1, ref# 1,2);

an optical system focusing said one of the plurality of laser beams, emitted by the light source unit, onto a recording surface of the recording medium (See Fig. 1, ref# 6,13);

a photo-detector unit receiving reflection beams, which are reflected from the recording medium in response to said one of the plurality of laser beams focused by the optical system, to generate detection signals from the received reflection beams (See Fig. 1, ref# 14); and

a holographic unit having a first hologram suited to the first laser diode and a second hologram suited to the second laser diode, the first hologram provided to diffract a reflection beam of the laser beam of the first laser diode to the photo-detector, the second hologram provided to diffract a reflection beam of the laser beam of the second laser diode to the photo-detector (See Fig. 1, ref# 12,13, Figs. 2a,2b)

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Regarding claim 2, Kamiyama discloses wherein the photo-detector is provided to receive the diffracted beams from each of the first hologram and the second hologram (See Fig. 1, 2a, 2b, ref # 14)

Regarding claim 4, Kamiyama discloses wherein the first hologram and the second hologram of the holographic unit are provided in a single optical module (See Detailed description paragraph [0029]; Fig. 1, ref #17,16,12,13)

Regarding claim 5, Kamiyama discloses wherein the first hologram and the second hologram are arranged with a spacing between opposing surfaces of the first and second holograms (See Detailed description paragraph [0029]; Fig. 1, ref #12,13)

Regarding claim 6, Kamiyama discloses wherein the first hologram and the second hologram of the holographic unit are respectively configured into a first polarizing hologram and a second polarizing hologram (See Detailed description paragraphs [0016])-[0017]; Fig. 1, 2a, 2b)

Regarding claim 7, Kamiyama discloses wherein a focusing detection region of each of the first and second polarizing holograms has an optimum grating depth to provide a predetermined diffraction efficiency for one of the laser beam wavelengths of the first and second laser diodes (See Detailed description paragraphs [0033]-[0036].

Regarding claim 13, Kamiyama discloses wherein the first laser diode and the second laser diode are respectively provided on a first LD chip having a decentered emission point and a second LD chip having a decentered emission point, the first and second LD chips being arranged in parallel such that a distance between the decentered emission points of the LD chips is smaller than a distance between centers of the LD chips (See Detailed description paragraph [0064])

Claim Rejections - 35 USC § 103

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claims 8 and 9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kamiyama JP Publication No. 2000-076689 in view of Funato U.S. Patent No. 6,072,579.

Kamiyama discloses wherein the first hologram and the second hologram of the holographic unit are respectively configured into a first polarizing hologram and a second polarizing hologram but does not expressly disclose wherein each of the first and second

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polarizing holograms contains an obliquely deposited film and wherein each of the first and second polarizing holograms contains an oriented organic film.

However this feature is well known in the art as evidenced by Funato, which discloses a polarizing holograms that contains an obliquely deposited film and holograms contains an polarizing oriented organic film (See col. 18, lines 6-38; Figs. 11-20)

It would have been obvious to one with ordinary skill in the art at the time of the invention to form wherein each of the first and second polarizing holograms contains an obliquely deposited film and wherein each of the first and second polarizing holograms contains an oriented organic film, in order to avoid time consuming manufacturing process, production in large-quantity at low cost and a small size can be provided, as suggested by Funato.

Allowable Subject Matter

8. Claim 3 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

a. U.S. Patent No. 5,894,464 to Kim et al., which discloses a holographic optical pick-up unit having a first hologram suited to the first laser diode and a second hologram

suited to the second laser diode, the first hologram provided to diffract a reflection beam of the laser beam of the first laser diode to the photo-detector, the second hologram provided to diffract a reflection beam of the laser beam of the second laser diode to the photo-detector.

b. U.S. Patent No. 6,366,548 to Ohyama, which discloses a holographic optical pick-up unit having a first hologram suited to the first laser diode and a second hologram suited to the second laser diode, the first hologram provided to diffract a reflection beam of the laser beam of the first laser diode to the photo-detector, the second hologram provided to diffract a reflection beam of the laser beam of the second laser diode to the photo-detector.

c. U.S. Pub. No. 2002/0024916 to Ueyama et al., which discloses a holographic optical pick-up unit having a first hologram suited to the first laser diode and a second hologram suited to the second laser diode, the first hologram provided to diffract a reflection beam of the laser beam of the first laser diode to the photo-detector, the second hologram provided to diffract a reflection beam of the laser beam of the second laser diode to the photo-detector, wherein the first laser diode and the second laser diode are respectively provided on a first LD chip having a decentered emission point and a second LD chip having a decentered emission point, the first and second LD chips being arranged in parallel such that a distance between the decentered emission points of the LD chips is smaller than a distance between centers of the LD chips

d. U.S. Patent No. 6,552,990 to Kaiyama et al., which discloses a first laser diode and a second laser diode are respectively provided on a first LD chip having a decentered

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emission point and a second LD chip having a decentered emission point, the first and second LD chips being arranged in parallel such that a distance between the decentered emission points of the LD chips is smaller than a distance between centers of the LD chips.

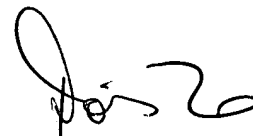
Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jorge L Ortiz-Criado whose telephone number is (703) 305-8323. The examiner can normally be reached on Mon.-Thu.(8:30 am - 6:00 pm), Alternate Fridays off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Doris H To can be reached on (703) 305-4827. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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